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ABSTRACT

This study examined the change in mothers' working models of infant feeding through the first post-term year of full-term infants and of prematurely born infants with a history of lung disease. It also examined the contribution of maternal resources such as education and mental well-being and infant attributes (maturity at birth and lung disease in the neonatal period, birth weight, weight-for-age z-score, and amenability) to changes in working models. The sample was comprised of 38 mothers of premature infants and 52 mothers of full-term infants. At 1, 4, 8, and 12 months post-term age, assessments were made of the adaptiveness of the mothers' working models of feeding via a video-assisted interview, the mother's symptoms of depression, the infant's weight-for-age z-score, and the infant's amenability. Analysis showed change in adaptiveness of the working model of feeding with time. The change was not linear; the highest adaptiveness scores were at 4 months and the lowest at 8. Only a mother's education and symptoms of depression had a significant effect on adaptiveness--education at 1, 8, and 12 months and symptoms of depression at 8 months. Findings suggested directions for nursing intervention. (Three tables delineate findings. Contains 14 references and 3 tables.) (Author/KDFB)

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Mothers' Working Models of Caregiving in the Context of Infant Feeding: Change Through the First Year

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Abstract

We examined the change in mother's working models of infant feeding through the first post-term year of prematurely born infants with a history of lung disease and of full-term infants. We also examined the contribution to this change of maternal resources (education, mental well-being) and infant attributes (maturity at birth and lung disease in the neonatal period, birth weight, weight-for-age z score, and a temperament variable, amenability). The sample included 38 mothers of premature infants (MPI) and 52 mothers of full-term infants (MFTI). Assessments of the adaptiveness of working models of feeding via video-assisted interview, a mother's symptoms of depression, the infant's weight-for-age z scores, and the infant's amenability were made at 1, 4, 8, and 12 months post-term (PTA) age. Hierarchical fixed occasions repeated measures analysis showed change in adaptiveness of the working model of feeding with time. The change was not linear; the highest adaptiveness scores were at 4 months and the lowest at 8. Only a mother's education and symptoms of depression had a significant effect on adaptiveness--education at 1, 8, and 12 months and symptoms of depression at 8 months. These findings suggest directions for nursing intervention.

Mothers' Working Models of Caregiving in the Context of Infant Feeding:

Change Through the First Year

Little is known about a mother's mental activity concerning feeding a young infant. Theory of working models (Bowlby, 1988; Bretherton, 1985) and theory of caregiving (Bowlby, 1988; George & Solomon, 1996; Solomon & George, 1996) provide concepts for eliciting mothers' descriptions of this mental activity. Aspects of this activity include the orientation to the feeding; response to infant agendas and co-regulation of the feeding; cues on which feeding decisions are based; feeding strategies; how feedings are patterned, and criteria for evaluating adequacy of intake and of feedings in general (Pridham, 1993). Adaptive working models of feeding include both short- and long-range goals and are high in reflectiveness, integration of disparate aims, and expression of a sense of the infant as a person. The adaptiveness of working models may change through an infant's first year as self-feeding skills develop and new modes of feeding are expected. They may be influenced by a mother's personal resources (e.g., education) and well-being (e.g., symptoms of depression). The working models of feeding may also reflect what the infant brings to the feeding, including maturity and weight at birth, weight-for-age relative to other infants of the same gender, and the amenability of the infant's temperament. Knowledge of the contributions to working models of maternal and infant variables through the first year could help to explain change and advance understanding of feeding practices.

The study objectives were to: (a) examine change in the adaptiveness of a mother's working model of feeding through the infant's first post-term year for both mothers of infants born at term (MFTI) and of prematurely-born infants with a history of lung disease (MPI); and (b) examine the contribution of a mother's education and depressive symptoms and of the infant's maturity at birth/ neonatal lung disease, birth weight, weight-for-age relative to the population of infants, and amenability of temperament to adaptiveness.

Methods

Mothers' working models of infant feeding were assessed at 1, 4, 8, and 12 months after the infant's expected birth date (post-term age) for 61 mothers of premature infants (MPI) and 53 mothers of full-term infants (MFTI). Descriptive and attribute data for the mothers and infants in both groups are shown in Table 1. Because we did not collect data on all of the variables early in the study, specifically symptoms of depression and perception of infant temperament, and because of missing data, generally due to technical problems in audio tape-recording the data collection interview, only a subset of the total sample could be included in this study. This subset did not differ from the total pool of mothers and infants in any significant way.

Place Table 1 about here

Measures and instruments. Features of a mother's working model of infant feeding were elicited with a focused interview combined with replay of a videotape of a just-completed feeding. Categories of these features and rating scales were applied to the transcribed audio-tape of the interview. A measure of working model adaptiveness was obtained from the summed ratings on eight 6-point scales: (a) focus of the feeding; (b) acknowledgement of infant agendas; (c) decision-making cues; (d) criteria for structuring the feeding; (e) criteria for evaluating intake; (f) assessment of how well the feedings are going; (g) infant feeding participation; and (h) the patterning of feedings. Inter-rater agreement of coding within one scale point was 80% on average.

A mother's education was her self-reported years of formal schooling. The mother's symptoms of depression in the past week were assessed at 1, 4, 8, and 12 months with the 20-item Center for Epidemiologic Study-Depression Scale (CES-D Scale, Radloff, 1977). The Scale items were developed for use with a community population, and represent the major symptoms in the clinical syndrome of depression. these symptoms include depressed mood; feelings of guilt, worthlessness, loneliness, and hopelessness; psychomotor retardation; and disturbances in

concentration, sleeping, and appetite. The higher the score (range 0 to 60), the more intense the depressive symptoms. Reliability and validity studies of the instrument have been reported by Myers and Weissman (1980), Radloff (1977), and Weissman, Sholomskas, Pottenger, Prusoff, and Locke (1977). The CES-D Scale alpha coefficients for the study sample ranged from .68 to .81 for the four assessments.

The infant's birth weight (in grams) was obtained from the infant's hospital birth record. The infant's weight-for-age *z* score (see Krick, 1986) was obtained at 1, 4, 8, and 12 months post-term age using the data published by Fomon (1993) as the reference. Infants were weighed nude on a Mettler (PM15) electronic scale, which weighs to the nearest gram and averages fluctuating weights sampled over a 5-second interval. The reported weight was the mean of two assessments within 3 g of each other.

The infant's amenability was the total score on five 9-point graphed rating scales, marked at scale ends with bipolar descriptors for the mother's assessment (eg., 1 for "not at all," 9 for "extremely") on each of the following items: (a) soothability, (b) positivity of mood, (c) distractibility when crying, (d) regularity of feeding, and (e) regularity of sleeping (Pridham, Chang, & Chiu, 1994).

Data analysis. Sequential hierarchical fixed occasions repeated measures modeling was used to examine the contribution at each time point of each predictor variable to adaptiveness of the working model of feeding. The small sample did not permit us to examine the contribution of each variable in the context of the other predictor variables.

In our fixed occasion model each mother j ($j = 1, \dots, N$) is measured on the adaptativeness variable (Y) at occasion i ($i = 1, \dots, T$). The adaptativeness scores for mother j can be expressed as:

$$\begin{aligned} Y_{1j} &= \beta_{1j} \\ Y_{2j} &= \beta_{2j} \\ &\vdots \\ Y_{Tj} &= \beta_{Tj} \end{aligned}$$

This model can be rewritten showing the explanatory variables:

$$\begin{array}{rcccc} & X_{1j} & X_{2j} & \dots & X_{Tj} \\ Y_{1j} & = & \beta_{1j}1 & +\beta_{2j}0 & +\dots +\beta_{Tj}0 \\ Y_{2j} & = & \beta_{1j}0 & +\beta_{2j}1 & +\dots +\beta_{Tj}0 \\ & \vdots & & & \\ Y_{Tj} & = & \beta_{1j}0 & +\beta_{2j}0 & +\dots +\beta_{Tj}1 \end{array}$$

Each occasion effect can be modeled as a mean value γ and a residual μ , as shown here:

$$\begin{aligned} \beta_{1j} &= \gamma_{10} + \mu_{1j} \\ &\vdots \end{aligned}$$

$$\beta_{Tj} = \gamma_{T0} + \mu_{Tj}$$

In turn, each occasion effect may be further modeled as a function of various covariates (Z) (e.g., infant diagnosis, birth weight, mother's education, etc.), as shown here:

$$\begin{aligned} \beta_{1j} &= \gamma_{10} + \gamma_{11}Z_j + \dots + \mu_{1j} \\ &\vdots \\ \beta_{Tj} &= \gamma_{T0} + \gamma_{T1}Z_j + \dots + \mu_{Tj} \end{aligned}$$

Results

Descriptive statistics for study variables for the mother-infant pairs with complete data sets are shown in Table 2 for each of the four assessments. The scores for the various scales making up the adaptiveness score ranged from 1 to 6. Transcribed interview responses from three mothers are shown in the Appendix to illustrate a low, medium, and high rating for strategies for structuring the feeding.

Place Table 2 about here

Results of the sequential modeling (one at a time) of the effect of predictor variables on working model adaptiveness at 1, 4, 8, and 12 months post-term age are shown in Table 3. Overall, working models of feeding were highest in adaptiveness at 4 months PTA and lowest at 8 months.

Place Table 3 about here

The two maternal resource variables had an effect on adaptiveness at specific times during the infant's first post-term year. The more education mothers had, the higher their working models were in adaptiveness at 1, 8, and 12 months, but not at 4 months PTA. Mothers' symptoms of depression had a negative influence on the adaptiveness of working models at 8 months PTA. When both education and symptoms of depression were added to the base model, education no longer had an effect at 12 months. None of the infant variables contributed to adaptiveness at any of the infant ages.

Conclusions

The extent to which working models of infant feeding are adaptive changes through the first year. However, the change in the working models is not linear and indicative of increasing adaptiveness. The level of adaptiveness may reflect the mother's temporal experiences. The adaptiveness of a mother's working model of infant feeding through the first post-term year may depend more on a mother's personal resources than on infant biologic and temperament attributes. The facts of an infant's prematurity, low birth weight, and history of lung disease apparently did not have a large enough impact on these mothers' ways of thinking about their infants, themselves as caregivers, and/or feeding their infants to make the quality of adaptiveness specific to the group (MFTI, MPI).

At 4 months PTA, the lack of a significant effect of a mother's education on adaptiveness may have been a consequence of the infant's needs being relatively easy to understand and to manage, no matter what the mother's education. Infant amenability, which includes temperament qualities relevant to ease of management, did not have a significant effect on adaptiveness. However, on the whole, amenability scores were relatively high through all four assessments. If mothers had perceived their infants as being lower on Amenability, the effect on adaptiveness of the feeding working model may have been greater.

The significant negative effect of a mother's symptoms of depression on adaptiveness of the working model at 8 months PTA may be a function of the new challenges posed by the infant's developing self-feeding interests and skills. At this age, the mother's working model must be adaptive to accommodate these changes and to support the infant's increasing participation in the feeding. Symptoms of depression may make it difficult for a mother to recognize the need for change, to want to change, or to feel effective and confident in making a change (Cummings & Davies, 1994; Gross, Fogg, & Tucker, 1995). On the whole, mothers reported relatively few symptoms of depression. With higher scores on the CES-D Scale, a more extensive effect of these symptoms on adaptiveness may have been detected.

Mothers' working models of infant feeding, as assessed by the video-assisted method used in this study, changed through the infant's first post-term year in ways that suggest that the mother's personal resources interact with her experience of the infant. This experience was not tapped by the measure of the infant's amenability used for the study. The experience may have something to do with how a mother views her own competence in light of her goals for infant feeding. The contribution of mothers' education and symptoms of depression to the adaptiveness of the working model of feeding suggest that nursing intervention to support mothers' learning and development of a sense of competence relevant to things about the infant's feeding that matter to her could potentially support greater adaptiveness of infant feeding practice.

References

- Bowlby, J. (1988). A secure base: Parent-child attachment and healthy human development. New York: Basic Books.
- Bretherton, I. (1985). Attachment theory: Retrospect and prospect. In I. Bretherton & E. Waters (Eds.), Growing points of attachment theory and research. Monographs of the Society for Research in Child Development (Serial No. 209, 50(1-2)), 3-35.
- Cummings, E. M., & Davies, P. T. (1994). Maternal depression and child development. Journal of Child Psychology and Psychiatry, 35, 73-112.
- Fomon, S. J. (1993). Nutrition of normal infants. St. Louis, MO: Mosby.
- George, C., & Solomon, J. (1996). Representational models of relationships: Links between caregiving and attachment. Infant Mental Health Journal, 17, 198-216.
- Gross, D., Conrad, B., Fogg, L., & Wothke, W. (1994). A longitudinal model of maternal self-efficacy, depression, and difficult temperament during toddlerhood. Research in Nursing & Health, 17, 207-215.
- Krick, J. (1986). Using the z score as a descriptor of discrete changes in growth. Nutritional Support Services, 6, 14, 16, 21.
- Main, M., Kaplan, N., & Cassidy, J. (1985). Security in infancy, childhood, and adulthood: A move to the level of representation. In I. Bretherton & E. Waters (Eds.), Growing points of attachment theory and research. Monographs of the Society for Research in Child Development (Serial No. 209, 50(1-2)), 66-104.
- Myers, J. K., & Weissman, M. M. (1980). Use of a self-report symptom scale to detect depression in a community sample. American Journal of Psychiatry, 137, 1081-1083.
- Pridham, K. F. (1993). Anticipatory guidance of parents of new infants: Examination of theoretical bases and the potential contribution of the internal working model construct. IMAGE: The Journal of Nursing Scholarship, 25, 49-56.
- Pridham, K. F., Chang, A. S., & Chiu, Y. M. (1994). Mothers' parenting self-appraisals: The contribution of perceived infant temperament. Research in Nursing & Health, 17, 381-392.

Radloff L. (1977). The CES-D Scale: A new self-report depression scale for research in the general population. Applied Psychological Measurement, 1, 385-401.

Solomon, J. (1996). Defining the caregiving system: Toward a theory of caregiving. Infant Mental Health Journal, 17, 183-197.

Weissman, M. M., Sholomskas, D., Pottenger, M., Prusoff, B. A., & Locke, B. (1977). Assessing depressive symptoms in five psychiatric population: A validation study. American Journal of Epidemiology, 106, 203-214.

Appendix

Transcribed interview responses from three mothers concerning strategies for structuring a feeding of an infant at 8 months post-term age

I. Low level of adaptiveness on structuring a feeding.

Interviewer(I): As the feeding got started, were there some things that you thought you needed to do to help get it going?

Mom(M): A number of things. First trying to capture her attention, rather than having her look all over the place and that's what this was about--waving the jar in front of her face and making little airplane motions with the spoon. Really just a number of things. Talking to her, telling her "no" when she tries to twist around in her high chair, trying to make eye contact, saying her name, really a lot of things to get it started and keep it going.

I: How well do those things work to get her attention and keep the feeding going?

M: Usually talking to her doesn't really help and I don't know why I continue to do it. What seems to be the most effective is snapping my fingers up above her head or holding the jar up there. It gets her to look up and it's easier to get access to her mouth that way than if she's turning around or looking down and playing with her bib. It's just easier for me, I guess.

I: If she looks up?

M: Right. If she's distracted enough, she will not remember to tense up her jaw to refuse the spoon and I can get it in easier. That's tricky and manipulative, but it seems to work. It's a real battle of the wills. I don't know who is stronger, [the baby] or myself. She's just as determined to refuse the food as I am to get her to eat it.

I: How does that make you feel?

M: Frustrated. And then I feel guilty for feeling frustrated. She's just a baby. I try not to let it show that I get very stressed out and frustrated with her feeding. I sometimes feel that if she picks up on that, she's going to refuse it even more or she's going to get upset. (Rating: 2)

II. Moderate rating on adaptiveness of structuring a feeding

I: What kinds of things do you need to do in order to keep the feeding going?

M: Usually there isn't too much of a problem at all. She pretty much adapts to any situation. She likes the fruit, although she ate everything in the bowl. She got some [food] on her hand. I think she would have had a lot more fun. We would have played a little bit more had she not been fussing. When she fusses, I just stop and change the pace or the environment and then try again a little later.

I: Can you tell me what you were thinking about when you gave her the balloon?

M: She just likes it. It's something different to try and get her mind off of the food or crying.

I: So the idea is to?

M: Distract her, calm her down.

I: With the idea of then continuing on with the feeding?

M: Right.

I: [Referring to the video tape] You were saying at that point, "Now you're doing it."

M: She was calming down. I thought she might continue on with the feeding. I shift her from the infant seat into my arms thinking that if I held her it might calm her (Rating: 4).

III. High rating on adaptiveness of structuring a feeding

I: I wonder if there ever is a time you have to do something to keep the feeding going.

M: No. If it doesn't work--a lot of times at dinner, he just doesn't care about it and he's tired. I'll nurse him and give up on it.

[Reviewing the video tape]: He's doing a good job.

I: What tells you he's doing a good job?

M: It's getting to his mouth and he's eating and he's content. He's continuing to do it and not feeling frustrated with it.

I: How do you decide when to offer more to drink?

M: After he's been eating for awhile, he usually appreciates a drink. I just kind of guess. He'll reach for it. And if I hold out a cup and he gets anxious and eager to drink, I'll give him a couple of more drinks after that. It doesn't seem like he gets so much in his mouth.

I: So after he's had some food?

M: Then I assume he's thirsty. We really need to work on drinking more. I imagine he wouldn't have to nurse so much afterward if he were more satisfied.

I: And by working at it, what would that look like?

M: I should probably offer him more drinks from the beginning. (Rating: 6)

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Table 1. Demographic and Attribute Data for the Mothers and Infants (N = 114)

	Infant Maturity Group			
	Premature (n = 61)		Full-term (n = 53)	
	M	SD	M	SD
Mother				
Age (years)	29.9	5.9	29.2	5.1
Education (years)	13.9	2.6	15.5	2.8
Number of children	2.1	1.3	2.1	1.2
Marital status	f	%	f	%
Married	49	80.3	42	79.2
Partnered, living together	6	9.8	5	9.4
Partnered, not living together	1	1.6	2	3.8
Single, divorced, separated	5	16.7	4	7.6
Race/ ethnicity				
Caucasian	54	88.5	48	90.6
African American	5	8.2	5	9.4
Asian	1	1.6	0	0
Latina	1	1.6	0	0
Infant	M	SD	M	SD
Birth weight (grams)	1123	310	3527.8	546.8
Gestational age at birth (weeks)	28.3	2.0	39.71	1.3
	f	%	f	%
Male gender	28	45.9	25	47.2
Diagnosis (lung disease)				
Respiratory distress syndrome, no bronchopulmonary dysplasia	31	50.8		
Bronchopulmonary dysplasia	30	49.2		

Note. The education of mothers of premature infants was significantly less ($\alpha = .05$) than that of mothers of full-term infants.

Table 2. Descriptive Statistics for Study Variables at Four Assessments for Premature and Full-term Infants

Variable	1 Month			4 Months			8 Months			12 Months		
	N	M	SD	N	M	SD	N	M	SD	N	M	SD
Mother's education (years)												
Full-term	45	15.7	2.8	51	15.5	2.8	44	15.4	2.8	52	15.5	2.8
Premature	35	13.7	2.0	38	14.1	2.4	33	14.0	2.3	37	14.0	2.3
Symptoms of depression												
Full-term	45	10.8	7.7	51	10.0	9.4	44	9.7	7.3	52	9.2	8.3
Premature	35	9.9	7.4	38	9.6	9.5	33	8.7	8.8	37	8.8	9.4
Infant birth weight												
Full-term	45	3572.6	562.4	51	3538.5	552.0	44	3523.5	565.6	52	3535.1	549.5
Premature	35	1097.6	283.1	38	1136.0	303.7	33	1120.5	310.1	37	1114.8	289.7
Weight for age z score												
Full-term	45	1.0	1.6	51	0.1	1.2	44	-0.1	1.2	52	-0.2	0.9
Premature	35	-0.5	1.4	38	-0.6	1.4	33	-0.6	0.9	37	-0.5	1.0
Amenability of temperament												
Full-term	45	6.2	1.2	51	6.5	1.1	44	6.6	1.0	52	6.6	1.1
Premature	35	5.9	1.1	38	6.6	1.2	33	6.7	1.0	37	6.9	1.0
Working model adaptiveness												
Full-term	45	4.0	0.7	51	4.1	1.0	44	3.5	1.2	52	3.8	0.9
Premature	35	3.8	1.1	38	4.0	0.7	33	3.3	1.1	37	3.6	1.1

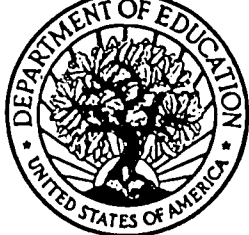
Table 3. Sequential Modeling (One at a Time) of the Effect of Predictor Variables on Working Model Adaptiveness at 1, 4, 8, and 12 Months Post-Term Age: Part 1

	Base Model		Model 1		Model 2		Model 3	
	Estimate	SE	Estimate	SE	Estimate	SE	Estimate	SE
Fixed parameters								
1M ^a	3.90	0.10	1M	0.13	1M	0.21	1M	0.53
4M	4.07	0.09	4M	0.12	4M	0.20	4M	0.50
8M	3.40	0.13	8M	0.17	8M	0.28	8M	0.63
12M	3.70	0.11	12M	0.14	12M	0.23	12M	0.59
			Prem ^b 1M	0.19	BW ^c 1M	7.5e-05	ED ^d 1M	0.03*
			Prem4M	0.18	BW4M	4.4e-05	ED4M	0.03
			Prem8M	0.26	BW8M	9.9e-05	ED8M	0.04*
			Prem12M	0.21	BW12M	8.3e-05	ED12M	0.04*
Variance								
1M	0.79	0.12	0.78	0.12	0.78	0.12	0.73	0.11
4M	0.73	0.11	0.72	0.11	0.72	0.11	0.72	0.11
8M	1.32	0.21	1.32	0.21	1.31	0.21	1.02	0.16
12M	1.01	0.15	1.01	0.15	1.01	0.15	0.97	0.14
Likelihood ratio	875.618		874.612		874.315		852.80	
Chi square (4 df), change			1.006		1.303		22.82*	

^aMonth(s)^bPrematurity^cBirth weight^dMother's education

Table 3. Sequential Modeling (One at a Time) of the Effect of Predictor Variables on Working Model Adaptiveness at 1, 4, 8, and 12 Months Post-Term Age: Part 2

Fixed parameters	Model 4		Model 5		Model 6		Model 7	
	Estimate	SE	Estimate	SE	Estimate	SE	Estimate	SE
1M ^a	4.03	0.15	1M	0.10	1M	0.44	1M	0.60
4M	4.13	0.13	4M	0.09	4M	0.49	4M	0.53
8M	3.88	0.17	8M	0.13	8M	0.74	8M	0.63
12M	3.82	0.15	12M	0.11	12M	0.61	12M	0.65
Depress ^c	-0.01	0.01	WAZ ^f 1M	0.03	Amen ^g 1M	0.01	ED1M	0.04*
1M								
Depress	-0.006	0.009	WAZ4M	0.09	Amen4M	-0.07	ED4M	0.03
4M								
Depress	-0.05	0.01*	WAZ8M	0.19	Amen8M	0.03	ED8M	0.17
8M								0.04*
Depress	-0.01	0.01	WAZ12M	0.08	Amen12M	-0.05	ED12M	0.04
12M								
							Depress 1M	0.01
							Depress 4M	0.01
							Depress 8M	0.01*
							Depress 12M	0.01
Variance	1M	0.76	0.12	0.12	0.78	0.12	0.79	0.12
	4M	0.72	0.11	0.11	0.72	0.11	0.71	0.11
	8M	1.10	0.17	0.20	1.28	0.21	1.32	0.21
	12M	0.99	0.15	0.15	1.01	0.15	1.01	0.15
Likelihood ratio χ^2 (4 df), change		862.958		871.382		874.282		842.143
							22	
		12.06*		4.236		1.336		33.475*
^c Symptoms of depression			^f Weight-for-age z score		^g Infant amenability			



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4/14/97

March 25, 1997

Dear Colleague:

It has come to our attention that you will be participating in the **62nd BIENNIAL MEETING OF THE SOCIETY FOR RESEARCH IN CHILD DEVELOPMENT** to be held April 3-6, 1997, in Washington, D.C. We would like you to consider submitting your presentation, or any other recently written education-related papers or reports, for possible inclusion in the ERIC database.

As you may know, **ERIC (the Educational Resources Information Center)** is a federally-sponsored information system for the field of education. Its main product is the ERIC database, the world's largest source of education information. **The Clearinghouse on Elementary and Early Childhood Education** is one of sixteen subject-specialized clearinghouses making up the ERIC system. We collect and disseminate information relating to all aspects of children's development, care, and education.

Ideally, your paper should be at least eight pages long and not have been published elsewhere at the time of submission. It will be reviewed and we will let you know within six weeks if it has been accepted.

Please complete the reproduction release on the back of this letter and return it with two copies of your presentation to **Booth #25** at the conference or mail to **ERIC/EECE**. If you have any questions, please come and see us during the conference or call 1/800/583-4135 or e-mail <ksmith5@uiuc.edu>.

Sincerely,



Karen E. Smith
Acquisitions Coordinator